

THE RELATION OF SPONTANEOUS AMNESIA, EGO STATES, AND HIDDEN OBSERVERS TO POST-HYPNOTICALLY DISSOCIATED TASK INTERFERENCE

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This experimental study was designed to test a basic corollary when two tasks are being performed simultaneously, one in the conscious state and the other in a dissociated unconscious state, that the state which is the most amnesic to the other will suffer the greatest interference and hence behavioural deterioration.

Of 20 high hypnotisable subjects the five most amnesic were compared to the five least amnesic on their ability to carry on simultaneously a reading-aloud task and an automatic counting task.

As predicted, amnesic subjects performed significantly worse than non-amnesic subjects for errors in the automatic counting task. The findings are discussed in terms of the contribution to neo-dissociation and ego-state theories and the implications for therapeutic strategy in the treatment of dissociative conditions.

Hilgard (1977) discovered that subjects showed covert awareness and continued to respond to sound stimuli when rendered hypnotically deaf. He also demonstrated covert awareness to pain stimuli in hypnotically numbed hands when the subject was apparently not consciously aware of the pain. Hilgard described this phenomenon as due to a covert, cognitive structural state and termed it "the hidden observer." From these observations he postulated hypnosis as exemplifying a covert, parallel processing of data and proposed a "neo-dissociative" theory of hypnosis. This same phenomenon can be observed in "automatic writing."

Functional independence was originally regarded as one of the supposed characteristics of hypnotic dissociation. Accordingly, Burnett (1925) researched automatic writing with the expectation that, when hypnotically dissociated, two tasks should both show improved performance as compared with the two tasks when conscious. He did not clearly demonstrate this.

Messerschmidt (1927) investigated the effect on oral reading and on oral addition by the automatic handwriting of the other. She found very significant interference in both cases. Cass (1942) found similar evidence of interference when the two tasks were oral colour-naming and a subconscious arithmetic task. Other investigators, notably Stevenson (1976) and Knox, Crutchfield, and Hilgard (1975) reported comparable data. These findings caused Hilgard (1977) to conclude that "the subject's ignoring of the subconscious task while performing the conscious one is very real to many highly hypnotisable subjects, but that the effort required to maintain one task at a subconscious level leads to interference."

Bowers and Breneman (1976) reported a study in which the subconscious task was touching the nose with a finger, upon hearing a number amidst letters through an earphone to an hypnotically deafened left ear, the conscious task being to repeat a prose passage being introduced simultaneously through an earphone to the right ear. Their results were mixed, with some 8 of 12 subjects actually performing better with one task subconscious.

John and Helen Watkins, drawing on the theories of Paul Federn (1952), had been developing a treatment approach based on the hypnotic resolution of conflicts between covert personality segments, hence, "ego states." These, unlike true multiple personalities, can be observed only under hypnosis. Replicating Hilgard's hidden-observer studies on patients whom they had previously treated by ego-state therapy, Watkins and Watkins (1979, 1980) reported that many of the covert ego-states with which they had dealt therapeutically proved to be the same entities as Hilgard's hidden observers. These entities acted like covert multiple personalities in regard to hypnotically dissociated hearing or pain like Hilgard's "hidden observers." They held that the degree of dissociation between two different ego states is related to the rigidity or impermeability of the boundary which separates them, with true, overt multiple personality representing the extreme on a continuum.

Between two ego states four conditions are possible: (a) complete amnesia in both directions, hence, two-way amnesia; (b) state A (the primary one) not aware of B, but B aware of A (one-way permeability); (c) B unaware of A, but A (the waking state) aware of B; and (d) complete awareness in both directions, hence permeable boundaries.

Based on Hilgard's neo-dissociation theory and on the ego-state theory of Watkins and Watkins, when a covert ego state ("hidden observer") is activated the following hypotheses seem warranted:

- H1: When ego state B (the covert, hypnotically activated state) is aware of A (the primary, non-hypnotic and conscious one) then written counting singly by it will exhibit greater interference, as manifested by slower speed and more errors, than when the written counting is performed by A.
- H2: When ego states A and B perform different tasks simultaneously (reading and counting respectively) there should be a performance decrement (interference) in the task of that state (A or B) which is aware of the other.

H3: If the boundary between ego states A and B is permeable in both directions a two-way awareness exists, and the largest degree of interference should occur for both tasks combined in the conscious state.

In the following study 10 highly hypnotisable subjects participated at two different levels of consciousness involving single and simultaneous performance of two tasks: oral reading and written counting. Performance on these two tasks were compared when both were performed consciously, and then with reading conscious but counting dissociated via a post-hypnotic suggestion. These were related to spontaneous amnesia versus awareness, as interpreted in terms of different degrees and directions of rigidity in ego-state boundaries.

As determined by hypnotic susceptibility tests, the 20 most highly suggestible subjects were selected from 127 volunteers. These subjects were then deeply hypnotised individually for 30–40 minutes. Dissociated counting was instituted in their dominant hand via a post-hypnotic suggestion. They were then rehypnotised on cue and interviewed under hypnosis to determine whether there might be another “part” of them which was aware of, and participating in, “the hand” counting. If such a part revealed itself (hence, a “hidden observer” or ego state B), it was interviewed via the dissociated hand. The important information to be obtained from this “part” was its degree of awareness of the waking subject (i.e., ego state A). Subjects were then brought out of hypnosis and the waking subject was interviewed as to their awareness of part B and what occurred under hypnosis.

On the basis of this screening, the five subjects among the 20 who exhibited the greatest degree of spontaneous amnesia and who also revealed the presence of a “hidden observer” or ego state B, were selected as the experimental group. As it happened, all amnesic subjects possessed an ego state B, which was aware of A, the conscious self, but A was not aware of B. The five subjects among the 20 who were most aware participated as controls.

All subjects were administered the same experimental tasks, reading and dissociated hand counting. The dependent measure was the subject’s performance on two-minute trials as measured in terms of (a) words read, (b) errors in reading, (c) numbers counted, and (d) errors in counting.

All tasks were assessed initially in the conscious state, then with the hand dissociated via a post-hypnotic suggestion, and finally in the conscious state again. The purpose of the two conscious measurements was to keep track of possible time effects, such as practice or fatigue. These did not occur. The experiment consisted of measuring single counting, single reading, and both counting and reading combined in the three conditions described: conscious, dissociated, conscious.

Eight, 2×3 split-plot ANOVAs were carried out for data from either single or simultaneous tasks for each of these four measures separately. All subjects deteriorated significantly for three out of four dissociated measures when performed singly (e.g., words read, numbers counted, and errors in counting). Amnesic subjects performed significantly worse than aware subjects

for errors in counting, but not for numbers counted as had been predicted. The data supported H3 overall.

Results for the five amnesic subjects with one-way awareness, that of ego state B which was doing the dissociated counting, for executive ego state A (conscious reading), but not vice versa (A aware of B), were predominantly in the direction of H2. This hypothesis predicted that dissociated counting would be interfered with due to B's awareness of A. However, the similarity in amnesic subjects for errors in counting performed singly and simultaneously with reading raises questions as to the validity of interpreting these data as occurring because of the variable of awareness versus amnesia. Several alternative explanations are possible.

Least difference (Fisher's significant difference tests, i.e., multiple comparisons) were performed comparing means obtained for the two conscious conditions, 1 and 2, to see whether time effects were occurring. No significant differences were detected. In addition, a 2×2 split-plot ANOVA was performed on data for conscious condition alone in trying to determine whether aware subjects performed more on conscious trials than did amnesic subjects as proposed by H3. No significant results were found. Therefore, this hypothesis was not supported.

DISCUSSION

H1 stated that the dissociated task to be employed, written counting, when performed singly, would be carried out more slowly and with more errors than when it was performed singly in the conscious state. This effect was expected to be more pronounced for subjects exhibiting the largest degree of spontaneous amnesia. The effect was in the predicted direction, and was highly significant for both numbers counted ($p < .005$) and for errors in counting ($p < .0006$).

The second part of H1, that amnesic subjects would deteriorate further than aware subjects, was not significantly supported for numbers counted. However, it was significant for errors in counting ($p < .022$).

H2 proposed that when ego states A and B performed different tasks simultaneously, such as reading and counting, there should be a performance decrement (e.g., interference) in the task of an ego state (A or B) that was aware of the other — hence, had a permeable boundary toward the other. In addition, when an ego state (A or B) was unaware of the other (thus, a rigid boundary toward the other) the task performed by that state, reading or counting, should exhibit no interference, that is, no performance decrement.

From this hypothesis we might infer that in a true multiple personality which was completely amnesic to the existence of alter-egos, the primary executive state would not manifest interference in its performance, but that the alter-ego which was aware of the executive personality would.

This hypothesis was most supported by the highly significant deterioration in performance for errors in counting by the amnesic subjects ($p < .001$). For

numbers counted the trend was in the same direction but the p of .183 was not significant. H2 received support for the most part.

H3 held that if the boundary between ego states A and B were permeable in both directions, that is, a two-way awareness existed, more interference should occur for both tasks in the conscious state than for amnesic subjects, since such awareness should be distracting for both states. This hypothesis pertains to the five aware subjects. A 2×2 split-plot ANOVA on data for the conscious conditions with dissociated data removed showed no significant results.

The second part of H3 was that the performance of aware subjects would be equivalent to the conscious levels in the dissociated conditions. There was not much difference between conscious and dissociated trials for these subjects on all four measures, and the difference between their means was found to be non-significant. This hypothesis received some support for a trend in the direction of all differences, but no single one was statistically significant.

The two possible explanations for these findings are:

1. The postulated relationship between ego states and the behaviour of these subjects may be invalid and not applicable to the present experimental situation; or
2. The important factor may be hypnotisability, rather than the type of awareness we are postulating, since the subjects in the amnesic group were probably higher in hypnotisability. However, the effect of covert ego states (or "hidden observers") still remains a viable interpretation of what was occurring. The findings are in line with both Hilgard's "hidden observer" (1977) data and with the ego-state theories of Watkins and Watkins (1981, 1986).

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PSYCHOTHERAPY AND HYPNOTHERAPY

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Fashions in psychotherapy reflect the influence of their social context. It is not coincidental that economic and psychological rationalism (especially cognitive behaviourism) have been parallel processes, concurrent with a mechanistic emphasis in medicine.

The ways in which human energy and functioning are conceptualised have profound implications for the theory and practice of psychotherapy. An holistic approach (body/mind/spirit in social context) linked to our three personal worlds (psyche, relationships, and culture) is necessary to avoid an overemphasis on physiological mechanisms, or to ideologically-based world views, and thus allow a focus on psychological mindfulness in all its complexity.

The centrality of emotional dynamics and the difference between the expression of experience and "wordsmithing" are outlined. The relationship between reason, emotion, and action in the context of hypnotherapy is illustrated, using the Spiegels' triadic classification of personality styles. Attention is drawn to the particular virtue of the trance state for therapeutic work — the access it provides to the psychology of experience.

Hypnotherapy is related to psychotherapy as a special case of a general process, with illustrations of how trance can be used to help or hinder progress. The conclusion is drawn that an holistic approach to healing serves a useful function in protecting the professional practitioner from the narrowness of current fashions in psychotherapy.

CULTURAL FASHIONS IN PSYCHOTHERAPY

Fashions in psychotherapy reflect the influence of their social context. It is not accidental that both economic and psychological rationalism have been concurrent parallel processes in recent times. Simultaneously, mechanical and technological procedures have been prominent in medicine.

Psychoanalysis began with an emphasis on a rational search for patterns of expression in affect, thought, and action, deriving from both conscious and unconscious motivations. The recognition of transference and counter-transference patterns in therapy broadened the focus to include parallel processes at the level of relationships. Alexander, an influential training analyst based in Chicago, balanced the traditional cognitive approach by insisting that the patient needed a corrective emotional experience (Alexander & French, 1946). Reich and his followers ensured links between bodily and mental patterns were explored, and synthesisers such as Wilber (1979) provided an hierarchical

schema of interlinking systems that included spirituality, world views, and connections to the cosmos.

Behaviour therapy began with an impersonal and rational approach using an objective and external analysis in contrast with the subjective and internal focus of psychoanalysis. The focus was on the smile rather than the smiler. Skinner (1976) sought to integrate learning principles into a Utopian social context, but as far as I am aware, *Walden II* remains as absent in practice as its more human prototype. In the context of clinical practice, Ellis (1962) added the emotional processes to the rational ones when the advantages of *both* an internal and an external viewpoint could no longer be denied. But thoughts remained the prime movers. Reason was still King. Across the Atlantic in more recent times the President of the British Psychological Society lectured on the emotions: "A psychological approach to the emotions should be founded on a recognition of their *rationality* [italics added] and functional value; disorders of the emotions can then be conceptualised as aberrations of normal functioning" (Watts, 1990).

Cognitive-behaviourism has become the dominant therapeutic approach in Australia during the last decade. During this time, a colleague, presenting at a conference of the Australian Society of Hypnosis, identified himself as a cognitive-behaviourist, though personal inquiry has since revealed a grounding in psychodynamics. He proceeded to discuss the case of a young, married country woman who presented with a loss of bowel control. Her story revealed that she had conceived during a liaison with a lover who was subsequently killed in a motor accident. Their child had been born three months prior to her seeking help for her symptoms. I was dismayed to hear that feelings had been left out of account in such a context.

At a recent conference of the Australian Psychological Society, a colleague presented his conceptualisation of panic disorders in terms of sensations and cognitions. It seemed to me that the sensations in question might be called body feelings. When I asked him where had all the feelings gone, he asked me what was the difference between thoughts (or cognitions) and feelings. I replied that, from a developmental perspective, feelings precede thoughts. Later I reflected that when I *feel* angry, sad, joyful, excited, I do not *think* these emotions, even though I have related thoughts which to me are a different kind of experience.

Incidentally, I happened to be consulted by a married woman of mature years who had been treated by this colleague for her panic attacks. Apparently, he had not discovered the psycho-logic of her symptoms: (a) her attacks occurred when she was driving — she lacked control of her domestic locations since this depended on her husband's employer; and (b) she had "unfinished business" regarding an affair with a workmate and avoided his presence. In an unposted letter to her lover, she wrote: "Your legacy to me was five years of misery . . . I panic every time I drive . . . my eyes died. . . my heart aches constantly, causing great anxiety . . . you my love were the beginning of my nightmare . . . I'm

scared I'll see you again . . . do you know I've hardly visited the city in recent years." She had an intense fear of being left alone, having been rejected by lovers several times. She responded well to holistic, experientially based therapy involving thoughts, feelings, and actions, including trancework. Of course, I saw her husband to gather information, explain my strategies, and to enlist his cooperation, while maintaining her confidentiality. She kept some of her secrets from me too, but we did meet as persons.

What alternatives to psychoanalysis and behaviourism are available? In the 1960s there developed the so-called "third force" of humanism, embracing aspects of existentialism. This was the time of the human potential movement. Since that time, the connections between Western and Eastern styles of helping persons get in touch with their potential have been strengthened, especially with the widespread learning and teaching of such techniques as relaxation, meditation, and trance. This humanistic existential approach focuses primarily on first hand experience.

Unlike behaviourism, the primary emphasis of existential psychology is not on behaviour and, unlike psychoanalysis, not on biological instincts and their vicissitudes in the development of character structure. Existential psychology . . . takes *experience* as its starting point. The behaviourist unit, habit, becomes important for the existential psychologist primarily in terms of how it is *experienced* by the person behaving. The psychoanalytic unit, the character structure, becomes important primarily in terms of how it is experienced by the person involved in the conflict. (Keen, 1970, p. 4)

Keen commented further:

It may seem a little surprising that this starting point is new, and one must understand the historical development of psychology to account for the heretofore rejection of the "subjective" . . . in the face of psychology's modest success in treating "mental illness" it is worthwhile to follow this new approach wherever it will lead. (p. 5)

It thinks the influence of this third force has been muted by the professional preoccupation with psychological rationalism during the 1980s. Yet there are some signs of a more balanced approach, as, for example, illustrated in the writings of Hobson (1985), Mahrer (1989), and Mehl (1986).

AN HOLISTIC APPROACH

It seems, then, that the way in which human energy is conceptualised has profound implications for both theory and practice in therapy. In existential terms, a balanced being for self, others, and in the world means being well or well-being. The conceptualisation necessarily includes bodily, mental, and spiritual interlocking systems in social context. From a psychological point of view, the body is the ground of action, but a focus on physiological mechanisms as *the* explanatory dynamic is inadequate for psychologising. Here the trap is mechanistic reductionism. The mind is the realm of thinking and feeling, the land of the imagination. Here the trap is to get lost in speculative

internal dynamics. Spirit is concerned with soul, a non-material world view of man's relation to the cosmos. Here the trap is ephemeral speculation. So, though body as a physical base and spirit as an aspect of world view are necessary supports, an holistic approach to psychologising is necessary. For me, psychologising involves building apt metaphorical bridges between the familiar and unfamiliar aspects of human experience. The process necessarily involves a combination of both logical and psycho-logical modes of thought, thereby including both conscious and unconscious processes.

I find the Spiegels' formulation of self/body concepts useful in clinical practice (Spiegel & Spiegel, 1978). In discussing how a person can influence their body within limits, they describe three main strategies:

1. self/body in opposition, with the fighting relationship fostering the opposition;
2. self/body undifferentiated, with the symptom being denied; and
3. self/body engage in constructive confrontation with the person affirming the self and thereby mastering the symptom.

Ready illustrations of these systemic interactions can be observed in persons with psychosomatic complaints, that is, body symptoms. A useful inquiry in such circumstances is to ask the patient whether they feel *at home* in their body. By way of illustration, I recall a man with many body symptoms whose mother explained his distress by telling him that a sometime-resident uncle was the *thorn in his side* — maybe he took turns with his depressed wife; and a young woman, complaining of the self-caused roughness of her fair skin, who had a very competitive and ambivalent relationship with her only and elder sister, who really got *under her skin* at times, as did her reluctant married fantasy lover.

The documented instances of multiple personalities who are left-handed in one personality and right-handed in another, or who may have diabetes in one personality and not in another, together with the increasingly recognised instances of such cases of multiples, especially in response to traumatic experiences in childhood, surely point to the need for an holistic approach rather than a partistic one. The writings of Borysenko (1987), Mehl (1986), Meares (1960), Mindell (1987), and Sutherland (1992) are cited as illustrative of an holistic approach to human experience.

THE CENTRALITY OF EMOTIONAL DYNAMICS

Richardson (1984), an expert in the fields of personality and imagery, points out that psychologists are not merely neutral observers of the human condition, rather they are active shapers of the beliefs of human beings about themselves. We cannot, on the one hand, adopt a machine-like view of man — emphasise his rationality in the manner of the hard sciences — and, at the same time, demand, at least for ourselves, that we be treated with humanity, that is by criteria which are excluded from the machine account. He adds that a central

function of psychotherapy is to help people to experience their feelings and emotions more fully and to discriminate between fundamental emotions and their more subtle blends.

Pierce, Nichols, and DuBrin (1983) discuss the relationship between catharsis and change.

Expressing feelings is a major and probably essential cause of therapeutic change in our work . . . But it is not true that those who show the most catharsis show the most change. More significant than the most catharsis per se are: 1. expressing feelings which previously were avoided; 2. having a cognitive connection to those feelings; and 3. becoming more expressive than previously . . . To be truly cathartic, feeling-expression must invoke some breaching of defences. (p. 271)

I recall the case of a Chinese student at the University of Western Australia who presented in a conflict, a paralysis of action. The induction of an hypnotic trance overcame his reluctance to own the depth of his dilemma and resulted in a cathartic spasm of sobbing; he felt that he could not succeed in the course that he had been sent overseas to study, *but* he could not return home without a degree because of the loss of face involved. The flexibility of his thinking was probably increased as a consequence of my validation of his emotional release and subsequent "working through" of his dilemma.

Now I wish to draw a distinction between the emotional expression of traumatic experience and "mental mechanics" or "wordsmithing." I recall my experience in a recent workshop run by an American expert in Ericksonian hypnotherapy. The program was well structured, a variety of teaching and learning modes was used skilfully: lectures, case demonstrations, practice exercises. The centrality of pattern interruptions as a precursor to the process of change was emphasised; the virtues of flexibility over rigidity were illustrated; metaphors were created with cleverness and cognitive relevance; and pleasant brief group trances were available. Yet for me there were deficiencies in the presentation. Words were the dominant mode of communication. They were words which I understood and found relevant, but on their own they did not cover adequately the complexity of the human psyche. The approach was primarily cognitive, with little attention to interpersonal process in either the client's developmental history or present relationship with the therapist. So, while admiring my colleague's skills, both theoretical and practical, I did not warm to him. I suspect that I envied his position as the teacher in charge, but that my critical response to his conceptual framework had a cognitive basis as well. Emotions as an energy source seemed to be taken for granted. Thus, *reframing* was primarily an exercise in mental mechanics with little consideration of the necessity for involving the client's emotional ego, the ego-ideal. Those who have seen David Spiegel's video of his trance work with the Vietnam veteran (whose adopted son was killed when the Viet Cong bombed the Red Cross hospital where the boy was an inmate) may remember the level of emotionality involved in that session, which also involved reframing of the relationship in memory between the adoptive father and son.

To summarise, then, not only do “actions speak louder than words” but, to me, “feelings are stronger than thoughts.” In an holistic approach, of course, actions, feelings, and thoughts all interact to create the ways of our being, for well or ill.

REASON, EMOTION AND ACTION IN HYPNOTHERAPY

What of consequence can be said about the relative emphasis of these three in trancework? The Spiegels’ research with induction profiles and resultant description of three main personality styles is relevant (Spiegel & Spiegel, 1978). *Apollonians* emphasise rationalisation and are relatively noncompliant. *Dionysians* compulsively comply with external signals whether presented in a formal hypnotic session or not, and are frequently amnesic to the signals. They have little interest in rationalising their behaviour. *Odysseans* fluctuate between periods of intense activity and times of withdrawal and despair, alternating between compliance and rationalisation. They tend to value both reason and action, with the balance shifting back and forth during the course of their lifetimes. These three clusters of attributes seem related to low, high, and mid-range performance respectively on the hypnotic profile. It is worth reminding ourselves that this classification includes therapists as well as patients.

Hence the need for flexibility of hypnotherapeutic approach, depending on the personality styles involved. If the patient be Dionysos-like, that is, adopts a naive posture of trust in relation to others, is prone to suspend critical judgment, has a tendency to affiliate easily with new events, lives in the present, has excellent memories, and an unusually good capacity for intense and focused concentration, then the therapist, especially if of a similar disposition, can expect a high degree of hypnotisability and would likely make plenty of use of the patient’s imaginative world, especially their emotional experiences. If, on the other side of the brain, the patient resembles Apollo in that he/she puts tremendous influence on reason and understanding and is very much prone to planning for the future and to employing their critical faculties to the utmost, then maybe I, on sensing all this from my Odyssean framework of experiencing the tension between reason, feeling, and action, should refer the patient to one of those currently fashionable cognitive-behaviour therapists. But, in this eventuality, I would not expect much influence of a lasting kind to result from trancework. Because of the personality styles involved, it would be difficult to create the particular virtue of the trance state in the context of psychotherapy — that is, the access it provides to the Alice-in-Slumberland of psycho-logic where symbols, metaphors, themes, and parallel processes abound and are expressed in the particular idiolect of the of the patient’s language of the heart, their emotional knowing (see Hobson, 1985).

CONCLUSION

So, of what do we need to remind ourselves as psychotherapists in general and as hypnotherapists in particular? How can trance be used to help or

hinder in clinical practice? In previous papers (Pitty, 1984, 1989), I have outlined my conceptual framework for psychotherapists and discussed some of the ways in which trance can be used to foster progress. The sequential processes of *being-with* the other/s, of having a *constructive encounter* with them which confronts the central dynamics of the problem situation, and of consequently *facilitating relevant action* in their personal and social context are applicable in the short *and* long term. These processes are necessarily involved in holistic help. Their formulation is necessarily at a high level of abstraction to accommodate the followers of Rogers, Perls and Ellis in interaction with all the Glorias (and their significant others) who might consult them. Their application to clinical practice is against the background of Sundberg's three fundamental perspectives: systems thinking, developmental history, and a choice of potential actions (Sundberg, Taplin, & Tyler, 1992).

The general ways in which trance can be used to complement the therapeutic process may be summarised as follows:

- TASK 1: Being with the patient; empathy, support, rapport, leading to trust and understanding. Little or no use of hypnosis at first; if well timed to follow the development of significant basic trust and understanding, rapport will increase.
- TASK 2: Constructive confrontation: discovering the central dynamics leading to an holistic formulation especially in terms of metaphorical processes. Scope for trancework to investigate depth aspects of central dynamics; use of memories and images, thoughts and feelings to provide corrective personal experiences.
- TASK 3: Fostering relevant action in personal and social contexts. Homework tasks and in-session exercises. Recognition that individual behaviour is part of interactional systems of reciprocal influence governed by implicit rules and expressed in roles. Use of post-hypnotic suggestions to reinforce constructive confrontation in context, leading to the resolution of conflicts and to affirmations of response-abilities and new insights, reframes, revisions flowing from the simultaneous operation of multiple perspectives during trance.

What traps and hazards are there in the use of hypnotherapy? The abuse of power in the relationship looms large, as discussed previously (Pitty, 1984). The lure of the quick-fix attracts the patient. The satisfaction of playing god benevolently encourages the needy therapist. The paucity of verbal feedback in directive trancework adds to the lack of empathic communication. The guiding principle that it is the therapist, rather than the patient, who needs to fit into the hypnotherapeutic situation bears repeating. Whose trance is it? Perhaps one of the advantages for the patient is the opportunity which the trance provides to be — with the core of their being, their having and their doing — but especially their being.

“Enlightenment consists of the progressive widening of the context of understanding,” says Mehl (1986, p. 324), in discussing the need for awareness

of “whole” and gestalts. “A second-order change might involve consideration that the patient’s basic lifestyle, and beliefs contributing to that lifestyle, must change to change the susceptibility to infection.” As therapists we need to seek enlightenment in the ever-widening context of patient, treatment process, and practitioner. This will involve a balance between those three faces of our being: body/mind/spirit in the personal and social context of those three lives of inner psychic reality, interpersonal relationship, and culture that we all live, with varying degrees of freedom and interaction.

There have always been fashions in psychotherapy, and the use of hypnosis in professional settings has waxed and waned since the days of Mesmer and before, I guess. These patterns of culture within the helping professions are bound to continue in rhythm with the preoccupations of the times. Professional practitioners like me will do well to retain a holistic perspective, and by this means protect themselves from the narrowness of perspective of those who follow the fashions. As for trance, it may help focus the point of view of both patient and therapist, but at least they are both working close to first-hand experience.

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ACCENTUATE THE POSITIVE: A DEVELOPMENT OF SPIEGEL AND SPIEGEL'S TECHNIQUE

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Using Spiegel and Spiegel's (1978) notion of making value of the body a central focus in treatment of substance abuse, I am able, in therapy, to help subjects change their emotional loading from negative to positive, with a focus on pleasurable and happy imagery in various modalities, the judgment of the body as being good and a source of pleasure, and the suggestion of giving back something (e.g., giving up cigarette smoking) as a gift to the body. The relevance of this approach to substance abuse and sexual dysfunction is discussed.

Spiegel and Spiegel (1978) described a technique which they used primarily in smoking cessation interventions. The patient is encouraged to develop respect for their body, with the corollary that they will not harm it by continuing with the destructive behaviour. In hypnosis, the patient is given three statements: "For your body, smoking is a poison. You cannot live without your body, to the extent that you want to live, you owe your body respect and protection." (Spiegel & Spiegel, 1978, p. 212).

This is a valuable, but somewhat negative approach. How much more enjoyable for the patient and therapist alike it is to focus as well on the hedonic value of the body and the physical and sensuous pleasure it provides. Instead of stressing the need for one's body and the harm one is doing to it by a particular behaviour, let the patient come to appreciate and value "good body" experiences, and to give the body a gift in return. One is reminded of the sound principle of learning theory, that reward is vastly more powerful than punishment or threat in establishing desired behaviours — and keeping them going.

The basic message of my approach is: "My body gives me pleasure. I not only respect it, I enjoy it. I will give it a gift in return." With hypnosis, the imaginative involvement domain has a great deal to offer for this approach.

These central ideas can be easily woven into many imagery scripts and can span a range of sensory modalities. They are not only useful for treating smoking: I have used them for substance abuse, eating disorders, and sexual difficulties.

The patient is taken through an imagery experience in hypnosis, with instructions to focus on the pleasurable sensory experiences involved and is then instructed to repeat the experience in the waking state, in real life. Exercises involving those undervalued senses of kinaesthesia and touch are universally engrossing. As well as for patients who present with body-harming problems such as smoking, they are useful for treatment of sexual dysfunction where a therapist might recommend sensate focus exercises (Masters & Johnson, 1970). Australian couples seem more reluctant than their American counterparts to engage in the disciplined and "artificial" sensate focus exercises (Ross & Channon-Little, 1991) and sensual, touch-related techniques in hypnosis can substitute as a less time-consuming input which has the advantage of not requiring the cooperation of a partner.

A very simple example would be to take a patient through the experience of waking up in the morning, stretching luxuriously, and becoming intensely aware of every part of their body, the feeling of warm sun on the skin and the anticipation of a good day ahead. Imagery of stroking a cat, focusing on the satiny warmth of its fur and the relaxing purring it makes, is another simple exercise — as long as the patient likes cats and is not allergic to them. The patient can be taken through the imagined experience of an unhurried bath with an expensive soap and encouraged to enjoy the silky feeling of the soap on the skin and the delicate scent, told to look at the bubbles very closely and to see their iridescent sheen. All of these experiences can be translated into real life "homework" with appropriate suggestions in and out of hypnosis.

The "good body" feeling need not always involve relaxation. Paying attention to the way one's muscles warm up during a weight training session on a cold morning or noticing how one settles into an easy rhythm while jogging or walking can be used, among many others. The therapist simply needs to find out what the patient enjoys and run through it in imagery, drawing attention to the various physical sensations which are pleasurable, with the statement or implication that the body is good and a source of pleasure.

Walker (1984, 1992) has emphasised that a patient in hypnosis can listen to music in a different way. She says: "We're going to use music for a while in a rather special way . . . You're going to let the music pick your mind up and carry it along." The power of this technique and its potential for transfer to the waking state was brought home to me by one of the very first patients with whom I used the technique. She was a diffident, middle-aged woman who returned for her second appointment and said: "I thought that people who liked classical music were just putting it on. I went out and bought the music you played and two other records. It's great." She had been referred for treatment of an air travel phobia and rang in after her overseas holiday

to say that she had listened to the classical music soundtrack throughout the flight and had had no problems with anxiety.

I first used focusing attention on the flavour and texture of food to slow down the ingestion of food (Stuart, 1977) as part of a behavioural weight loss package (Channon, 1980), drawing attention to the goodness of eating and the enjoyment of it. I rapidly realised that this principle could be used in any situation where the patient needed to be given permission and encouraged to enjoy “good body” feelings, while at the same time learning to control other factors in behaviour — in that situation giving up overeating but not the joy of food. Food enjoyment with restraint with regard to the amount of what is eaten is just another example of the many situations in which the therapist can say: “Look what your body does for you. Do a little bit back for it.”

These approaches are enjoyable for both therapist and patient. Further, they are probably more effective. I have had many anecdotal reports from smokers who have attended “hellfire and damnation” quitting programs but have become so anxious that their smoking escalated. The Hippocratic oath includes the phrase: “Above all do no harm.” It is difficult to imagine that these gentle, pleasure-enhancing techniques could be anything other than highly positive forces for growth.

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ELECTROPHYSIOLOGICAL CHANGES UNDER HYPNOSIS IN MULTIPLE PERSONALITY DISORDER: A TWO-CASE EXPLORATORY STUDY

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Electroencephalogram (EEG) recordings of two female multiple personality disorder patients at pre-hypnosis, during two hypnotically induced alter-personalities and at post-hypnosis were undertaken. Each of the four separate bandwaves was examined within each condition across all recording sites. During hypnosis both subjects demonstrated significant changes in alpha and delta activity, which appeared to be mostly localised in nature. In Case A there were also some localised changes in beta bandwave activity and Case B showed significant localised changes in theta activity. The specific intra-subject EEG changes between conditions in Case A appear to reflect some other phenomena as well as the hypnotic process, whereas with Case B, the differences between the conditions resembled changes due to hypnosis per se.

Multiple personality disorder (MPD) is defined as: "(A) The existence within the person of two or more distinct personalities or personality states (each with its own relatively enduring pattern of perceiving, relating to, and thinking about the environment and the self). (B) At least two of these personalities or personality states recurrently take full control of the person's behavior" (DSM-III-R, American Psychiatric Association, 1987). The different personality states usually have distinct unique characteristics in respect to speech, cognitive style, behaviour, and mannerisms (Putnam, 1989). The most important aetiological link in such patients is a history of childhood physical and/or sexual abuse (Braun & Sachs, 1985; Coons, 1985). It has also been documented in the literature that MPD patients are highly hypnotisable and often unknowingly slip into self-hypnosis (Braun, 1983).

There have been many reports of electroencephalographic (EEG) changes in adult normal subjects under hypnosis (Bauer & McCanne, 1980; MacLeod-Morgan & Lack, 1982; Sabourin, Cutcomb, Crawford & Pribam, 1990). It has

also been found that with both high- and low-hypnotisable subjects there is increased mean theta activity in hypnosis, with greater levels in the high-hypnotisable subjects particularly in the frontal regions and left hemisphere (Sabourin et al., 1990). Another researcher (Bick, 1989) has also reported increases in theta activity. These researchers argue that this may suggest an intensification of attentional processes and an enhancement of imagery in trance. These findings also confirm earlier work (Galbraith, London, Leibovitz, & Hart, 1970; Tebecis, Provin, Farnback, & Pentony, 1975). Increases in Beta activity during hypnosis have also been found, particularly in the temporo-occipital region (Bauer & McCanne, 1980; Bick, 1989). There has also been reported increased beta activity predominantly in the left hemisphere in high-hypnotisable subjects (Sabourin et al., 1990). However, the converse was found in 40 Hz activity in high-hypnotisable subjects, which, it was argued, is indicative of focused increased attention, while the low-hypnotisables showed a decrease of such activity in both hemispheres (DePascalis & Penna, 1990).

In respect of alpha activity, there have been increases in both the low- and high-hypnotisable groups, particularly in the occipital region (Sabourin et al., 1990). The opposite has been found with decreased alpha in both hypnosis and simulated hypnosis conditions in normal subjects (Bauer & McCanne, 1980). Other earlier researchers have shown Alpha to have a hemispheric shift from left to right under hypnosis (Morgan, MacDonald, & Hilgard, 1974; Morgan, MacDonald, & MacDonald, 1971). This shift was recorded in high-hypnotisable subjects. It was concluded that this was indicative of a higher degree of focused cortical activation (MacLeod-Morgan & Lack, 1982). A shift from left-hemisphere dominance to right-hemisphere dominance appears to be a process of inhibition of the left-hemisphere brought about by the hypnotic process (Gruzelier, 1986, 1988; Meszaros, Banyai, & Greguss, 1986).

There is a paucity of research published on EEG changes with MPD patients. In a single case study, alpha blocking was found in only two out of four alter-personalities as well as frequency and amplitude changes for both alpha and theta between the different personalities (Ludwig, Brandsma, Wilbur, Bendfeldt, & Jameson, 1972). It was concluded that the data were not readily explainable in differences in alertness and suggested real physiologic differences. Changes in alpha activity have also been observed between personalities but no conclusions were drawn (Larmore, Ludwig, & Cain, 1977). No changes in EEG were found between personalities in a male MPD (ex-alcoholic) subject (Cocores, Bender & McBride, 1984). Other studies have had negative findings (Putnam, 1984), including an EEG recording of the famous case — *the three faces of Eve* (Thigpen & Cleckley, 1954). Some differences among the various personalities of two patient subjects, as well as with their normal control who simulated two alter-personalities, have been found (Coons, Milstein, & Marley, 1988). The authors concluded that the differences in the EEG's frequency analysis in all three subjects were probably due to changes in concentration, mood, and the degree of muscle relaxation, rather than the effects of different personalities.

An investigative study of 50 MPD cases found some abnormal EEGs but did not do any separate bandwave analysis (Coons, Bowman, & Milstein, 1988). It was concluded that these findings were due to individual seizure and trauma history as well as the effects of medication. Autonomic lability and lateralisation in two separate alter-personalities in the one subject has also been documented (Brende, 1984). The different personalities had their own specific shift, as measured by electrodermal activity. This suggested a process of dissociation or a splitting-off of one personality from the other.

As there are mixed reports in the literature, the aim of this exploratory study was to compare the EEG frequency distributions for the conditions of pre-hypnosis, two similar hypnotically induced alter-personalities, and post-hypnosis, in two MPD subjects of approximately the same age and sex.

THE SUBJECTS

Both female subjects are private patients of the second author (GE) and have had extensive routine neurological investigations. They have also had extensive private psychotherapy, including hypnosis and several hospitalisations over a number of years.

There were some similarities in the subjects' backgrounds and in some of the alter-personalities. These had developed at specific times in relation to early childhood experiences. They were usually associated with poor mother/child relationships in which major abuse, neglect, and at times homicidal attempts by the mother as well as other family members, or other individuals took place. However, Case B's "Baby" personality had developed during psychotherapy. The alter-personalities are part of both patients' inner reality; are protective and some are hostile towards the core personality (Edwards, 1990).

CASE A

Case A is a 45-year-old clerk, married with two children. She has a long history of extensive medical and neurological investigations for various somatic symptoms. There is a strong family history of suicide and attempted suicide. Psychotherapy began when issues related to her (in her own words) "controlling, manipulative and hypochondriacal" mother and to early childhood sexual assaults by her step-grandfather, which had been kept secret, emerged. In late 1989 she was raped by a family friend.

There have been several alter-personalities emerge, including "Grandfather" (who claims to be 95 years old, if still alive), "Toots" (Mother), "Claude" (who is 18 years old), and "Baby" (who is about three years old, but at times says she also may be eight years old). "Baby" is always insecure, frightened, and tearful, and is terrified of being harmed by her mother "Toots" or attacked by the "Grandfather." She is particularly terrified of fire, and her mother had made many threats to burn her. She suddenly can find herself in adult situations (e.g., driving a car) when the other personalities are fighting, is

unable to cope, and as a result has had several minor car accidents. "Baby" tries to stay hidden and relies on "Claude" to protect her. "Claude," who is aggressive and spiteful, protects "Baby," particularly from "Toots" and frequently threatens to kill "Toots." She argues with "Toots" as to who owns the "Baby." She states it is also her task to toughen up the "Baby" so she can survive "Toots," if "Claude" does not succeed in killing "Toots" herself. "Claude" came into being the year that her sister left home (who, she claims, always looked after her). The two dominant alter-personalities "Baby" and "Claude" were recorded for the experiment.

CASE B

Case B is a 52-year-old nurse, married, with one child. She had been initially treated for major depression, but it became quickly apparent that the underlying issues were related to those of a severe borderline personality disorder. There had also been a history of violent physical abuse by parents and sexual abuse by others.

Apart from a fragmented core true self there are many distinct separate alter-personality states. These include "Ellen" — a 28-year-old writer who likes to be alone to read and study. This alter-personality has become interested in writing courses and literary associations and often takes over in situations for Case B when she has given lectures and talks about to her nursing. "Ellen" has intellectual and artistic interests and reports enjoying learning to use the personal computer, particularly for providing material which she feels may help GE to treat Case B.

"Ellen" sees Case B as extremely fragile and very battered. She wants to help and has written most of an autobiography on Case B's history and treatment.

Another predominant alter-personality is "Emma." She is a "baby" personality who says she is aged three and appeared suddenly after discharge following a month-long admission in a psychiatric hospital. When first encountered under hypnosis that week, she described her arrival as sudden — "A big balloon burst — you were outside — everything was shiny and bright." She says she is learning to write, spell, and learn about feelings when she (Case B) lets her out. She speaks in a very young, bright, and happy voice. She likes to cut pictures out and stick them in a scrapbook, play with dolls and draw, and take flowers in a basket from the garden.

"Emma," says Case B, wants to hide her as she is frightened she may become marked or harmed. Both the "Emma" and "Ellen" alter-personalities were recorded for this study.

METHOD

A 10–20 system electro-cap was used to record the EEG. Potentials were amplified 50,000 times with a bandpass of 0.5 to 70.0 Hz, before sampling at

256 Hz for two-second intervals on 30 separate occasions. (Event-related potential responses were also recorded but not reported in this paper.) Linked ears were used as the reference. Inter-electrode resistances were all less than 2 k ohms. Bipolar EOG recordings, from one centimetre above the outer canthus of the left eye and one centimetre below the outer canthus of the right eye, were also collected.

Subjects sat in a comfortable chair in a sound-attenuated room. Auditory thresholds were measured. An infrared eye-movement monitor system was placed 60 centimetres in front of the subject. This was used to display a dot in the centre of the screen. GE instructed the subjects to focus their gaze (either with eyes open or closed) without blinking, on the dot during the EEG recordings. The hypnotic induction was then performed by GE. Trance was confirmed by lower arm and hand analgesia to pinpricks. One recording session was done with Case B who had her eyes closed during all recordings. Two separate recording sessions, one week apart, were necessary for Case A, who had her eyes closed only in the "Baby" alter-personality.

Table 1 describes the EEG bandwave frequencies which were examined.

Table 1 The Alpha, Beta, Theta, and Delta Bandwaves and Frequences Which Were Examined

Bandwave	Frequency
Delta	2.0-3.5Hz
Theta	4.0-7.5Hz
Alpha	8.0-12.5Hz
Beta	13.0-44.5Hz

RESULTS

The mean and standard deviation for each subject's frequency percentage distribution of combined sites within each bandwave appear in Table 2.

Table 2 Means and Standard Deviations (in Brackets) of Combined Sites for Each Bandwave Recorded From Case A and Case B

Case A (eyes open)				
	Alpha	Beta	Theta	Delta
Pre-hypnosis	5.87 (0.70)	35.81 (10.39)	9.74 (1.44)	9.10 (1.35)
"Baby"	11.83 (4.0)	39.0 (13.3)	9.06 (3.20)	14.04 (6.29)
"Claude"	6.43 (0.69)	40.38 (7.21)	9.56 (1.83)	11.97 (2.78)
Post-hypnosis	6.59 (0.59)	44.81 (10.13)	8.65 (1.76)	9.24 (1.97)

Table 2 Continued

Case B (eyes closed)				
Pre-hypnosis	34.2 (13.68)	24.05 (10.88)	25.1 (5.28)	5.89 (1.64)
"Emma"	30.43 (11.42)	25.25 (11.37)	28.35 (7.10)	5.46 (1.21)
"Ellen"	27.58 (10.76)	26.63 (11.36)	27.1 (8.94)	5.41 (1.20)
Post-hypnosis	24.64 (13.36)	24.58 (11.37)	22.52 (8.46)	5.20 (0.82)

There was a far greater amount of alpha activity in Case B. There was no wave contamination (I/Os) during Case B, and Case A's "Baby" alter-personality recording had nine I/Os.

The relative frequency distribution of each bandwave for each case was subjected to separate analysis of variance (ANOVA) over the four conditions. See Table 3.

Table 3 Between-Condition Analysis of Variances of Each Separate Bandwave for Each Case

Bandwave	F-Ratio	Probability
Case A		
Alpha	26.85	0.000
Beta	1.90	n.s.
Theta	0.79	n.s.
Delta	6.34	0.001
Case B		
Alpha	1.64	n.s.
Beta	0.18	n.s.
Theta	1.71	n.s.
Delta	0.80	n.s.

For each subject, separate paired *t*-tests for combined sites of each bandwave were performed. The results appear in Table 4:

Table 4 The Between-Condition Paired Student *t*-Test Results of the Frequency Distributions within Each Bandwave

Case A	Case B		
Alpha			
"Baby" vs. Pre-hypnosis	5.67****	Pre-hypnosis vs. "Emma"	4.14**
"Baby" vs. "Claude"	5.39****		
"Claude" vs. Pre-hypnosis	3.22**		
"Baby" vs. Post-hypnosis	5.16****		
Pre-hypnosis vs. Post-hypnosis	3.03**		

Table 4 Continued

Case A	Case B		
Beta			
Post-hypnosis vs. "Claude"	3.35**		
Post-hypnosis vs. Pre-hypnosis	4.59***		
Theta			
Post-hypnosis vs. "Claude"	3.55**	"Emma" vs. Pre-hypnosis	4.30**
Pre-hypnosis vs. Post-hypnosis	7.59***	"Ellen" vs. Post-hypnosis	2.64**
		"Emma" vs. Post-hypnosis	3.30**
Delta			
"Baby" vs. Pre-hypnosis	3.11**	Pre-hypnosis vs "Emma"	2.48**
"Claude" vs. Pre-hypnosis	6.23***		
"Baby" vs. Post-hypnosis	3.22**		
"Claude" vs. Post-hypnosis	8.32***		

* $p < .05$. ** $p < .01$. *** $p < .005$.

For each case, significant overall and regional results for each separate bandwave are detailed below. Where the most significant changes in activity between conditions occurred, the frequency distributions across all sites are illustrated in Figures 1 and 2.

CASE A

As seen in Table 4, there were more significant differences in activity between conditions, particularly in the delta and alpha bandwaves (see Figures 1 and 2 respectively). The delta bandwave had the most significant changes in activity between conditions. Figure 1 shows the increased delta activity in "Baby" vs. pre-hypnosis ($t = 3.11$, $p = .008$), in "Claude" vs. pre-hypnosis ($t = 6.23$, $p = .000$), in "Baby" vs. post-hypnosis ($t = 3.22$, $p = .006$), and in "Claude" vs. post-hypnosis ($t = 8.32$, $p = .000$).

Figure 1 also demonstrates the significant changes between the alter-personalities within the pooled frontal (FZ, F7, F3, F4, F8) sites with greater activity in "Baby" vs. "Claude" ($t = 29.68$, $p = .000$) and "Baby" vs. pre-hypnosis ($t = 11.71$, $p = .000$). Additional significant frontal findings were seen in higher levels of delta activity in "Claude" vs. post-hypnosis ($t = 4.24$, $p = .013$) and "Baby" vs. post-hypnosis ($t = 18.12$, $p = .000$). Pooled posterior sites (PZ, P3, P4, O1, O2) also revealed significantly higher activity in "Claude" vs. pre-hypnosis ($t = 3.43$, $p = .027$) and "Claude" vs. post-hypnosis ($t = 6.60$, $p = .003$).

The alpha bandwave activity in the "Baby" alter-personality was significantly higher than the other states: "Baby" vs. pre-hypnosis ($t = 5.67$, $p = .000$), "Baby" vs. "Claude" ($t = 5.39$, $p = .000$) and "Baby" vs. post-hypnosis ($t = 5.16$, $p = .000$). "Claude" also had significantly higher alpha activity than in pre-hypnosis ($t = 3.22$, $p = .006$). See Figure 2.

Figure 1 Case A — Delta Bandwave Percentage Distribution for Each Condition (With Each Alter-Personality's Approximate "Age" Also Given) Across Each of the 15 Recording Sites

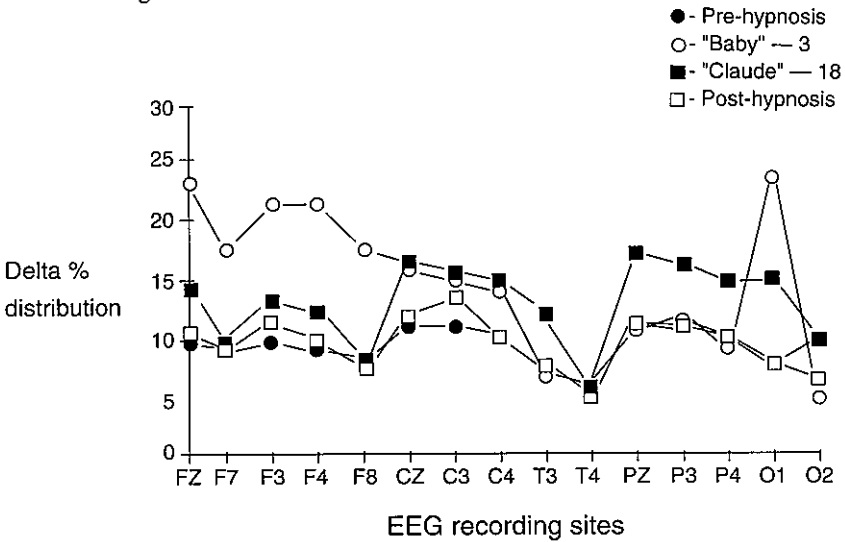
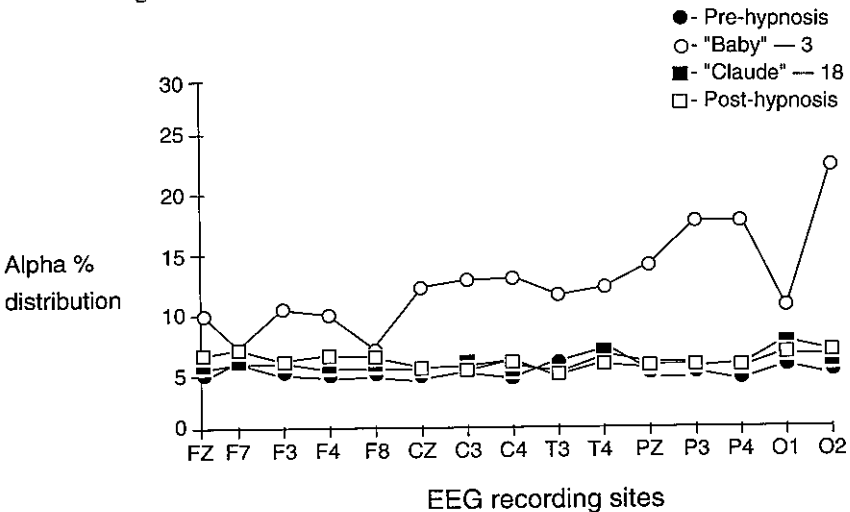


Figure 2 Case A — Alpha Bandwave Percentage Distribution for Each Condition (With Each Alter-Personality's Approximate "Age" Also Given) Across Each of the 15 Recording Sites



Additional *t*-tests were undertaken of pooled posterior sites which revealed significantly increased levels of alpha activity in "Baby" vs. pre-hypnosis ($t = 4.77, p = .009$), "Baby" vs. "Claude" ($t = 4.14, p = .014$), "Claude" vs. pre-

hypnosis ($t = 4.61, p = .010$) and "Baby" vs. post-hypnosis ($t = 4.67, p = .010$). In the beta bandwave over all sites there was significantly more activity post-hypnosis vs. pre-hypnosis ($t = 4.59, p = .000$) and with post-hypnosis vs. "Claude" ($t = 3.35, p = .005$). Pooled frontal sites were also analysed. Significant increases in beta activity occurred in "Claude" vs. "Baby" ($t = 6.75, p = .003$) and "Claude" vs. pre-hypnosis ($t = 10.44, p = .000$). There was also significantly less beta activity in "Baby" vs. post-hypnosis ($t = 22.60, p = .000$). In the temporal region pooled F7, T3, F8, T4 sites there was less activity in "Claude" vs. post-hypnosis ($t = 6.61, p = .007$). In the theta bandwave there was significantly less activity in "Claude" vs. post-hypnosis ($t = 3.55, p = .003$) and pre-hypnosis compared with post-hypnosis ($t = 7.59, p = .000$). A comparison of left versus right hemispheres demonstrated a significant difference in activity only in the delta bandwave during pre-hypnosis, with the left having a higher percentage of delta ($t = 2.93, p = .032$).

CASE B

In the theta bandwave there was significantly more activity in "Emma" vs. pre-hypnosis ($t = 4.30, p = .001$), "Emma" vs. post-hypnosis ($t = 3.30, p = .005$), and "Ellen" vs. post-hypnosis ($t = 2.64, p = .019$). Pooled frontal sites revealed significant differences between conditions with increased activity in "Emma" vs. pre-hypnosis ($t = 3.30, p = .030$), in "Ellen" vs. pre-hypnosis ($t = 5.22, p = .006$), in "Ellen" vs post-hypnosis ($t = 20.32, p = .000$), in "Emma" vs post-hypnosis ($t = 10.77, p = .000$) and in pre-hypnosis vs. post-hypnosis ($t = 3.46, p = .026$). In the delta bandwaves there was significantly more activity pre-hypnosis vs. "Emma" ($t = 2.48, p = .027$). Pooled frontal sites revealed a significant increase in "Emma" vs. post-hypnosis ($t = 3.46, p = .026$) and pre-hypnosis vs. post-hypnosis ($t = 4.81, p = .009$). There was only one significant finding in the alpha bandwave, with a decrease in activity in "Emma" vs. pre-hypnosis ($t = 4.14, p = .001$). Similarly, there was a significant difference in the posterior region ($t = 8.06, p = .001$).

There were no significant differences in activity between conditions in the beta bandwave.

Left versus right hemisphere comparisons found significant differences only in the delta bandwave with more activity in the left hemisphere ($t = 3.64, p = .015$) during pre-hypnosis and during "Emma" ($t = 3.20, p = .024$).

DISCUSSION

The most interesting finding from this study is the increased delta activity in Case A's "Baby" alter-personality. This was most evident in the frontal lobes with significant differences also between all states. Because increased levels of delta activity are not usually observed in adults, and diminish gradually with age, with the frontal and temporal lobes most resistant to change (Harmony, 1984), such a finding may be related to some electrophysiological

phenomena associated with that particular "Baby" alter-personality state. In contrast to Case A, Case B had significantly less delta activity in the "Emma" (baby) alter-personality compared to the pre-hypnotic state. To our knowledge, delta changes between alter-personalities, particularly "Baby"-type alter-personalities, have not been previously reported.

The alpha bandwave also showed significantly higher levels of activity in Case A's "Baby" alter-personality compared to the "Claude" alter-personality as well as compared to pre- and post-hypnosis states. "Baby" had significantly more alpha activity posteriorly than all the other states, which supports previous research (Sabourin et al., 1990). However, the "Claude" state was not significantly different from the post-hypnotic state. Such results may indicate that during the "Baby" state the subject was in a "deeper" level of hypnosis and generating more alpha activity. Despite the higher baseline levels of alpha activity (presumably also contributed by her "eyes-closed" state), Case B showed a significant decrease in alpha activity during the "Emma" alter-personality compared to pre-hypnosis state. This data resembles the previous findings of decreased alpha in both hypnosis and simulated hypnosis normal subjects, (Bauer & McCanne, 1980). It is also possible that the power of the electrophysiological changes due to hypnotic status may have clouded any between-alter-personality changes in this subject.

Theta activity was significantly higher in the "Claude" alter-personality but this was only when compared with the post-hypnosis condition. There was also significantly higher theta activity in Case B's "Emma" alter-personality compared to both the pre- and post-hypnosis states, but this was not significantly different from the other alter-personality — "Ellen." Frontally, there was significantly more theta activity in Case B's "Emma" and "Ellen" compared to pre- and post-hypnosis states, but no significant differences between the two alter-personalities. As both alter-personalities had similar levels of theta activity, this was probably due to hypnosis. Such increased Theta activity is also consistent with previous findings of Bick (1989) and Sabourin et al. (1990).

In the beta bandwave only Case A had significant changes in activity. "Claude" had significantly less beta activity than post-hypnosis, and approaching significance when compared to post-hypnosis. When the beta activity was pooled frontally, Case A's "Baby" had significantly less beta than "Claude" and post-hypnosis, also suggesting possible electrophysiological changes between the various states. In the pooled temporal region the only significant beta finding was that Case A's "Claude" had significantly less activity than in the post-hypnosis state. A similar decrease has been noted in beta activity in low-hypnotisable normal subjects, in both hemispheres, and only in the left hemisphere in high-hypnotisable subjects (DePascalis & Penna, 1990). This phenomenon is indicative of the inhibition of the left-hemisphere and augmentation of right-hemisphere processes during the hypnotic experience (DePascalis & Penna, 1990; Gruzelier, 1986, 1988; Meszaros et al., 1986).

Hemispheric comparisons revealed that only in Case B's "Emma" alter-personality was there significantly more delta activity in the left hemisphere. Such a finding conforms with previous research where an increase in delta activity in the right temporal-occipital lobes in normals was found. Specific hemispheric shifts in the alpha, beta or theta bandwaves while under hypnosis were not observed in either case (Bick, 1989).

CONCLUSION

In Case B, the results of this exploratory study were consistent with the observed EEG effects of hypnosis as previously seen in the literature. However, there could possibly be some additional electrophysiological phenomena associated with Case A's alter-personalities, particularly "Baby," as indicated by the changes in activity in the delta bandwave.

To determine if such is the case, future MPD EEG research is warranted. Investigation of specific bandwaves within alter-personalities of differing "ages" compared to pre- and post-hypnosis conditions could be examined.

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CASE NOTES

The aim of Case Notes is to enable readers to contribute brief items and case material drawn from their own experience. These may be case situations in which hypnosis has been used in treatment or a description of specific hypnotherapeutic techniques used within treatment contexts. The contributor is asked to supply as much information as is needed to ensure the reader has an understanding of the situation, the therapeutic aims of the hypnosis, and outcomes. It may also be appropriate for the contributor to research the relevant research and clinical literature to justify and explain their use of hypnosis. While the standard criteria for publications in the Journal will not apply to Case Notes, a clear exposition of the ethical professional practice of hypnosis will be required if the material is to be published.

RECALL DURING HYPNOTIC REGRESSION

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This case describes the recall of a woman during age regression, of events which occurred prior to her birth. While the case is anecdotal, it does raise the issue as to the nature of age regression and whether the client has truly regressed or is simply acting out a conceptualisation of what he or she thinks was the case at that earlier age and whether it is possible for a subject to access memories of such an early stage of her life.

Many hypnosis researchers have written about the nature of age regression and many more callers to the Society's referral sources request referral for hypnotic regression to their "past lives."

In his review, Weitzenhoffer (1953) argued there are three types of regression. In type I, the subject simply acts out or role-plays what he or she thinks are the appropriate cognitions and/or behaviours for the specified age. In type II regression, the subject experiences a physiological return to an earlier age. Type III regression is partly role-playing and partly a shift in the subject's

psychophysiological state, to an earlier stage of functioning. Although he allowed for its existence, Weitzenhoffer claimed that no cases of type II regression had been reported (Foenander & Burrows, 1988). The view that actual physiological regressions could occur has been consistently argued against by Orne (1951, 1988) and Foenander and Burrows (1988). They adopted a view of regression implied in Reiff and Sheerer's model of memory: True biological regression is not possible, but functional regression does occur, in which the subject reactivates and accesses early memory traces (Reiff & Sheerer, 1959).

It is now generally accepted by hypnosis practitioners that subjects in trance, experiencing age regression, do not physiologically regress to an earlier stage of life, but rather, use memory traces from that earlier stage. Where memory traces are not available, the subject will use other available memory traces from later stages of development, or will confabulate, with or without leading or ambiguous questions asked by the hypnotist (Foenander & Burrows, 1988; Orne, 1988; Reiff & Sheerer, 1959).

In order to recall information, subjects must have acquired and retained stimuli. The most primitive form of memory is sensory memory, the momentary lingering of sensory data after stimulation has ceased (Bootzin, Bower, Crocker, & Hall, 1991), which is dependent upon the persistence of neural activity for seconds after a stimulus is removed. Iconic sensory memory (also called visual sensory memory) has been researched extensively by psychologists, with less attention given to other forms of sensory memory, especially echoic memory (Darwin, Turvey & Crowder, 1972). The evidence suggests that echoic memory is more enduring than iconic memory, with echoic memory traces lasting for up to four seconds after a sound has ceased (Darwin et al., 1972).

In this case, we report the recall of memories of a subject, evoked while in age regression during hypnosis.

The Subject

Frances is a 41-year-old office manager who presented for the resolution of unresolved grief, which had persisted since her parents' divorce when she was aged seven, causing the break-up of the family and Frances' separation not only from her parents but also her sister and brother. She attended therapy with DMcG for 10 sessions, over a period of four months.

Her suitability for hypnosis was discussed in the second session, during which Frances' hypnotisability was assessed using the Stanford Hypnotic Clinical Scale (SHCS; Morgan & Hilgard, 1978), on which she scored 4/5.

Hypnotic regression was used in the third session, with the aim of taking Frances back to the age of seven, when her parents had divorced and she had been separated from her parents and siblings, to live with an aunt. She achieved a good depth of trance and was able to recall quite detailed events of her life when a child. She was quite frightened at times during the procedure, but, using the technique of taking her back to experience the events as an adult helped her feel more secure. At one point in the hypnosis session, when

Frances had been discussing a particular event when she was aged five, I asked her to return to her earliest memories, expecting her to return to memories when aged two or three. However, she jumped in the chair, with an action similar to a violent jerk of the body and said: "Mum's had a shock." I asked her to explain what was happening and she stated her mother: "Had just received an electric shock, while doing the washing." She recalled her brother placing his ear on his mother's stomach and saying: "The baby is okay" several times. Frances was then asked where she was, while this was happening. She replied: "I'm in Mum's tummy." I then asked her to describe what happened at this point. She described her mother being thrown out of the laundry door, landing on her back, and her father then helping his wife to her feet, saying it was lucky she had thongs on.

At this point, I brought Frances out of trance and discussed her recollections of these events. She stated this event had never been spoken about to her.

At the following session, Frances told me she had spoken to her mother of her recall under hypnosis and her mother confirmed that the events had occurred when she was seven months pregnant with Frances. She had accidentally come into contact with an electric current and had been thrown to the ground outside the laundry door. The behaviours of Frances' father and brother were reportedly consistent with Frances' recall. Her mother could not recall telling Frances of these events before.

During the following six sessions, Frances went on to explore her emotions in greater depth, using hypnosis and cognitive-behavioural therapy, reaching the point where she felt a healing process and a powerful sense of control begin to develop, where powerlessness and an inability to enjoy life had persisted for so long. She feels quite comfortable about her early memories and having dealt with the pain and distress of her early years. She noted frequently the impact of hypnosis and the healing process on her life, helping her increase her self-confidence and self-worth.

Discussion

Of course, we do not suggest that Frances' recall of events which occurred when she was in utero proves she was able to age regress to that state. However, this anecdotal case does highlight some interesting features of regression and its use in hypnotherapy.

Frances' recall of the events during trance seemed to have echoic and sensory elements to it. She recalled the sounds of her father and brother's voices and felt the sensory impressions of the electric shock (evidenced in her jerking behaviour in the chair). The physical reactions she showed when the memory was elicited were consistent with the reaction one would expect to accompany a mild electric shock.

While neither Frances or her mother could recall talking about the events before the recall in hypnosis, it is possible that Frances had been told something of what had happened, either by her mother, her father, or brother. Given the

lack of contact with her parents and brother since the age of seven, it seems likely that, if Frances had been told anything of the accident, this would have been when she was quite young. The intervening years, and lack of contact, may have resulted in her memories of having been told anything of the accident becoming dim.

Frances' regression in hypnosis and recall of the event described here, together with her recall of other significant events which occurred when she was six months old, not reported above, demonstrated for her a powerful example of hypnosis and provided a rationale for its efficacy as a treatment modality for her unresolved grief. Her belief in its efficacy extended to treatment for her poor coping with job stress and was an important factor in the overall positive outcome to hypnotherapy in this case. As therapists, we were also impressed by her response to the regression procedure and what was elicited during therapy.

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FINDING A SAFE PLACE IN TRANCE

Norman Shum

Psychiatrist

I would like to describe a clinical phenomenon to share with other members of A.S.H. and to ask through the Journal if anyone else has had the same experience.

After history taking, problem assessment and agreed decision to use hypnosis, my usual first induction of a patient consists of a standard eye fixation/distracton technique with or without deepening by arm levitation.

I achieve arm levitation in approximately 60% of patients or better on this first occasion. Regardless of whether levitation occurs or not, I continue with progressive muscle relaxation through the rest of the body and then ask the patient to go to a "special place." The only requirement being that it is "private, peaceful, absolutely safe, where nothing can bother you."

To enhance success and avoid disappointment I suggest that they may not find this seemingly "perfect" sanctuary on this first occasion. Many patients have no difficulty at all and the commonest place they take themselves is a pleasant beach.

A few have limited ability to use their various senses, not even visualisation, and report difficulty focusing in and on their "special place." A small number, a total of seven so far, have all spontaneously chosen to simply go into a colour rather than a place.

I have been surprised that each of these patients has chosen without any suggestion from me, either blue, indigo, or violet to wrap themselves in. They describe it like being in a fog, mist or clouds. One "sees" geometric shapes such as pyramids and cubes in his colour, but for the rest they are just blanketed with or in a colour at the blue end of the visible light spectrum.

Is this just coincidence or is there some other explanation, physical, physiological or psychological?! I would be pleased to hear from other ASH members who have noted this in their patients.

BOOK REVIEWS

Hypnosis and the Law: Principles and Practice. Barry J. Evans and Robb O. Stanley. Melbourne: Australian Journal of Clinical and Experimental Hypnosis. 1994. x + 289. \$34.95, softcover.

Hypnosis and its relationship with the law has been a topic of interest and importance to practitioners of the art, legislators and members of the judiciary since the work of Mesmer came under scrutiny in the latter part of the 18th century.

This relationship is important for two reasons. Firstly, in the area of legal controls over how, and by whom, hypnosis is used in the community, and, second, in regard to the admissibility in the court room of information obtained through the use of hypnosis, and indeed, of any evidence submitted by witnesses, victims or accused people who have been previously hypnotised in connection with the case.

This anthology by Evans and Stanley is presented in five parts, each dealing with different aspects of hypnosis and the law and, in all, there are 20 chapters.

Part One discusses general issues relating to the law and the hypnosis practitioner, and the editors have initially addressed the issue of establishing uniform legal controls to effectively regulate the practice of hypnosis in Australia. Robb Stanley, in Chapter 2, explains the existing situation and presents a draft of a proposed Act designed to establish a Hypnosis Registration Board of Victoria, which has been prepared by the Victorian Branch of the Australian Society of Hypnosis and has been circulated amongst the State Ministers of Health. If accepted by the majority of states, this Act is likely to be adopted by all.

This is a well-prepared document and proposes a Hypnosis Registration Act entirely separate from other psychological practices. It contains a definition of hypnosis which appears to be sufficiently specific, yet broad enough to allow for identification and control of the use of hypnosis, effectively confining it to properly trained professionals in the practice of their own profession. This document is a valuable contribution which can only enhance the professional status and reputation of the Australian Society of Hypnosis as the watchdog of standards and public safety in the use of hypnosis in Australia.

This anthology also brings together under one cover a selection of articles by a variety of authors, in both the clinical and experimental fields, which present and discuss the problems associated with the use of hypnosis in criminal

investigation and the presentation and admissibility of hypnotically elicited or influenced evidence in the courtroom. The problems to be confronted in this area are many and varied, and exceedingly complex.

In Chapter 3, Alan Schefflin reviews the current situation in the United States and gives a balanced view through the eyes of a legal practitioner of the problems facing the courts when hypnotically elicited evidence is presented. In Chapter 5, Perry and Laurence emphasise the necessity for very stringent and meticulous guidelines whenever hypnosis is used in forensic situations. In fact most clinicians, on reading this chapter, would probably avoid its use completely in any situation remotely associated with the forensic setting. Peter Sheehan, in Chapter 4, reinforces the need for very explicit guidelines to be formulated for forensic hypnosis practitioners in Australia.

The anthology includes the landmark set of safeguards and guidelines set by Martin Orne, to minimise the likelihood of contaminated or inaccurate testimony being admitted, to protect the rights of all parties involved, and to protect the psychological health of the subject. These were first published in 1979 and have since been updated by Orne and others.

Part Two of the anthology is titled: "Hypnosis, Memory and Accuracy of Recall." Sheehan, McConkey, and Linton, in separate chapters, discuss a number of factors affecting the content and accuracy of hypnotically elicited material, while Judd and Burrows discuss the Australian experience with hypnosis and the law. They all stress the need for stringent guidelines for forensic hypnosis.

It is interesting to note that the American Society of Clinical Hypnosis is currently engaged in the task of reviewing current guidelines for forensic hypnosis interviews, and also establishing guidelines for clinicians working in hypnosis and memory, especially in cases where there is the possibility of uncovering memories of abuse. The final draft recommendations will be eagerly awaited by all clinicians who work in these areas.

Part Three of the anthology discusses hypnosis and the law from the clinicians' viewpoint and Part Four presents the legal and police view. The "hypothetical" presented by Wendy-Louise Walker is melodramatic and theatrical, which I am sure was intended, and concludes that gross miscarriages of justice are possible with hypnosis. Her subsequent discussion and recommendations, along with other contributions to this book, are essential reading.

Part five, titled "Casework in Forensic Hypnosis," presents interesting case studies written by Australian practitioners. All in all, this is an excellent addition to the literature on hypnosis and the law. I would like to have seen included the articles by John G. Watkins titled "Hypnotic Hypermnnesia and Forensic Hypnosis — A Cross-Examination," published in the *American Journal of Clinical Hypnosis* (Vol. 32 No. 2, October 1989) and by John O. Behrs titled "Hypnosis Cannot Be Fully and Reliably Excluded From the Courtroom" (*American Journal of Clinical Hypnosis*, Vol. 31 No 1, July 1988), both of which express a balanced perspective on the relationship between hypnosis and the law.

This anthology should be required reading for all practising hypnotherapists, as one never knows when one may become involved in litigation, called to give evidence or have a patient or client involved in legal proceedings associated with the use of hypnosis.

GRAHAM WICKS, Women's and Children's Hospital, Adelaide.

Hypnosis in the Management of Anxiety Disorders. Barry J. Evans. Melbourne: Australian Journal of Clinical and Experimental Hypnosis. 1994. x + 247. \$34.95, softcover.

As a rule, anthologies are difficult to review, but in this case the task is made simpler and more enjoyable because of the high standard of the articles and the excellence of the editing. The editor states that the anthology is not designed for academics but aims to help "busy professional members of A.S.H." In my opinion, this aim is fulfilled extremely well indeed.

Of particular importance is the overview of the "nature, classification and aetiology of the anxiety disorders" and the thorough discussion of possible clinical intervention strategies. In my experience with students of hypnosis, there is a great variability in their knowledge of the nature and aetiology of the neurotic conditions which are an inevitable part of a clinician's work, and it is heartening to read an anthology which gives as much emphasis to the nature of the disorders as to the treatment techniques.

It is heartening also that two writers (in talking specifically about post-traumatic stress disorder), warn that practitioners must be aware that, because of the high hypnotisability of PTSD patients, it is always possible that hypnosis might increase rather than alleviate the condition. Thus, practitioners must proceed with caution. Might I also add a further warning that, since anxiety is sometimes an adaptive reaction (albeit a desperate one) because it acts as a safety valve, great care must be taken that removal of the safety valve does not precipitate ego-disintegration or even a psychotic episode. These examples serve to underline the need for a thorough knowledge of the neuroses before rushing blindly into a treatment of symptoms. This need is admirably satisfied in the present anthology.

The second half of the book deals mostly with case studies which illustrate not only the various forms of anxiety disorder, but also the use of hypnotherapeutic techniques in alleviating the disorders. The therapeutic techniques cover a very broad field, from straightforward behaviour-therapy through cognitive restructuring, neuro-linguistic programming, relaxation techniques and psycho-therapy. In each case the use of hypnosis is clearly explained so that the reader can learn from it.

Perhaps in future, as a further safeguard, some reference could be made to cases where neurotic disorders resemble organic conditions. I well remember my failure to alleviate symptoms of apparent neurotic anxiety in a patient

who was eventually diagnosed as a case of pheochromocytoma, a chromaffin tumour which has many of the same symptoms as acute anxiety.

This is an outstanding collection of articles, skilfully chosen and put together to illustrate the essential knowledge for a clinician using hypnosis — a book which should be an indispensable part of every practitioner's library.

LEO MURPHY, Private practice, Melbourne.

Hypnosis in the Management of Anxiety Disorders. Barry J. Evans. Melbourne: Australian Journal of Clinical and Experimental Hypnosis. 1994. x + 247. \$34.95, softcover.

The *Australian Journal of Clinical and Experimental Hypnosis* is a scientific journal of quality, and can compare with similar journals from other countries with some sense of pride in the level of presentation and the quality of content. For the researcher of information, however, there is a conspicuous lack of cumulative index, and so the volumes must be perused seriatim, scanning each journal's contents list for appropriate entries. This decided disadvantage is now being addressed by Barry J. Evans of Monash University, as he undertakes to edit anthologies of papers on various areas of hypnotherapy. A series of such anthologies will make the task of researching particular areas of treatment much easier, and provide a much better exposure of the wealth of local talent and experience coyly preserved in back numbers of the *Australian Journal of Clinical and Experimental Hypnosis*.

The first anthology, *Hypnosis in the Management of Anxiety Disorders*, presents in a well-bound and clearly printed volume. It has a clear list of contents (some 24 chapters) and of contributors. Unfortunately there is no indication of the date of the original papers on which the chapters are based, and we are left to assume that the authors have brought their work up to date for inclusion in the present work.

In a brief introduction, the editor underlines the fact that anxiety is the most common reason for seeking hypnotherapeutic help, and it seems appropriate as a subject for the first anthology. The argument as to whether PTSD should properly be included is politely deflected during a brief overview of the form and content of the work.

The first chapter, by J. Arthur Jackson, is 32 pages long and sets the standard with a scholarly overview of anxiety disorders, their nature and treatment. An adequate bibliography is appended to this, and every chapter.

Chapter 2 outlines in eight pages the general considerations and contraindications to the use of hypnosis in anxiety disorders. R.O. Stanley sets this out well, but the printers did not, transposing pages 38 and 39. A minor disappointment which will no doubt be addressed in later editions.

Chapter 3 goes into more detail with regard to choice of treatment strategies, and H.J. Jackson and R.O. Stanley provide thoughtful comment on the matter of fitting treatment interventions carefully to patient characteristics and needs.

In Chapter 4, B.J. Evans outlines the classification, psychology and treatment options for PTSD. He includes eye movement desensitisation reprocessing which, though not generally considered “hypnosis,” may make use of similar abilities in the subject.

In Chapter 5, the same author discusses specific hypnotic approaches to PTSD, and in an academically even-handed way suggests hypnosis should be considered as a possible modality in its treatment.

Chapter 6 begins a series of case studies reported in sufficient detail to give an insight into the conditions treated and the therapist’s ideas and methodology. Chapters 6 to 17 are all of this type and are written by experienced practitioners who share their experience and methods with good order and clarity. Apart from Anthony Basker (Chapter 12), who is mysteriously omitted from the list of contributors, and Daniele Jiranek (Chapter 6), all the contributors are or were in practice somewhere in Australia. They include Anthony J. Wild, Judith Leung, Lorna Channon-Little, Gordon Milne, Samuel H. Ginsberg, Anthony D. Diment, Henry J. Jackson and Shona M. Francey, Simon Stafrace and Susan Gaffney.

Chapters 18 to 22 present some interesting and more general observations by Harry Stanton on treatments of anxiety in various forms, and on the use of techniques to enhance sporting performance. While anxiety may be a limiting factor in physical performance, the interest in these chapters tends to spring from a discussion of methods, and the use of techniques “borrowed” from neurolinguistic programming.

Chapters 23 and 24, by Ian Bills and Graham Scott respectively, give good accounts of treatment of dental phobia.

This is not a textbook, nor a brief “how to do it” book, but rather an anthology of the thoughts, ideas, methods, and experiences of a number of the talented people working with hypnosis in Australia. It might well be relevant to have some indication of the date of the original papers but, this apart, the work is a well set out and useful reference, and good reading, especially if you missed the original publications. A worthwhile buy at just under \$35.00.

MICHAEL BOUNDY, Private practice, Adelaide.

A History of Hypnotism. Alan Gauld. Cambridge: Cambridge University Press. 1992. x +738. \$255.00, hardback.

Gauld’s book is a landmark study of the history of hypnotism between 1778 to 1914. It fills a void that has long existed in the scientific study of hypnotism. Its title, however, belies the reality that the book does not adequately cover hypnosis in the first half of the twentieth century. In Gauld’s defence, he indicates that this was not his objective. In this case, I believe the book’s title should be more specific.

In the first half of the book (Chapters 1–13) Gauld reviews extensively and in detail the history of mesmerism leading up to and including that of Mesmer. Reading these chapters provided me with a deep insight into the historical forces that have shaped the history and development of mesmerism and, ultimately, hypnosis. To some extent, the author seems to focus on the use of mesmerism with the occult and pays less attention to the use of the phenomena for clinical purposes. This could give many readers a distorted view of mesmerism and those who were working to see its use promoted within medical and psychological contexts. It neglects the work done by serious doctors and others who were working with mesmerism for therapeutic purposes.

In Part Two, Gauld turns his attention to hypnotism (as opposed to mesmerism) and rightly draws distinctions between the two. The content of these chapters has been reported in a number of historical texts, but the author has gone to the trouble of returning to primary sources — much to his credit. I found his analysis of the period from 1880 to 1910 to be detailed, well researched and well written. For some reason, Gauld then glosses over, in the final chapter, the work of Barber, the neo-dissociationists and socio-psychological approaches to hypnosis. Aside from his failure to address the missed period of 1920 to 1960 and the considerable developments in this period, Gauld also seems to miss the point that research in hypnosis grew when the discipline moved from a simple clinical focus to a setting where the methods of scientific research were applied to hypnosis.

This is a monumental effort and one that I think is a valuable contribution to the history of mesmerism and hypnosis. I think that it should become one of two such texts: this, and one that covers in greater detail the period 1915 through to the present time. It seems churlish to be overly critical of this book, given the magnificence of it and the work that has clearly gone into it. I believe that it is necessary reading for the serious student of hypnosis and its history.

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